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A REVIEW OF LITERATURE ON PSYCHO-SOCIAL

SATISFACTIONS OF OUTDOOR RECREATION

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A Review of Literature on Psycho-Social

Satisfactions of Outdoor Recreation

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Review of the Literature on Psycho-Social
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Introduction

Understanding some underlying psychological theories is essential to understanding the existing research on the outdoor recreationist. As a result, this literature review has taken three general steps. First, the literature on the broad concepts of human psychology have been examined. Second, a review of the basic approaches to recreation behavior and the psycho-social aspects of outdoor recreation is presented. Finally a discussion of research on specific recreation activities is included.

A variety of psychological theories and concepts have been published that relate to the behavior of outdoor recreationists. The array of theories seems to indicate that immaturity of the study of human recreation activity. It also suggests that definitive answers concerning the satisfactions of outdoor recreation activities are not available. Those few activities that have been studied for several years illustrate a continual refinement of techniques and results, not a pattern of confirming early results. In most cases the generalizations concerning recreationists have been subdivided into smaller and smaller groups. For example, studies of hunters have recently broken down this broad category into specific types of hunters, age groups, and geographic locations. It is reasonable to expect this research pattern to continue

with other types of recreation activity. Nevertheless, generalizations useful to the recreation planner and manager are available. Their limitations must be appreciated.

"Satisfactions" of recreation have not been the focus of most research of outdoor recreation behavior. Early studies focused on user characteristics or "attitudes." The underlying assumption was that characteristics and attitudes had a direct relationship to behavior and reflected the recreationist. Some researchers have recently argued that this is not the case. A second major field of outdoor recreation behavior research has been in the area of "motivation." In theory, motivation provides an understanding of the satisfaction that a recreationist is seeking. Finally, the terminology of the human product of recreation activity is not uniformly applied. Some researchers have investigated "outcomes," others the "products" and more recently the "satisfactions" of outdoor recreation. The approach in this review has been to consider part of the literature of attitudes and motivation as it appears to relate to satisfaction. Without both a conceptual understanding of where human behavior research is coming from and the recent efforts on first attitudes, then motivation and finally satisfaction, the review would be less useful to the recreation planner and manager.

The research available on the satisfactions of specific recreation activities is fragmentary. The field of study is definitely in its early stages of development. Basic theories and concepts and research methodology are not uniformly accepted. B. L. Driver, a well known researcher on recreation behavior, argues that a major reason for recreation is the reduction of stress. Yet others argue that some recreationists are stress

seekers. Obviously, there are no simple answers or explanations for the human products of recreation activity.

Some basic concepts

Many social psychological studies have their origin within the hedonistic theory of behavior. First offered by English utilitarians, hedonism contends that man "behaves" to seek pleasure and to avoid pain. Early hedonistic theory began to change when Tolman (1932) began to argue for an approach to behavior explanation which was cognitively oriented and considered expectations as well as motivation. This in turn led to related concepts of satisfactions.

Several theories developed over the next few decades. All of the current theories include the concepts of outcomes, of attractiveness of outcomes (or satisfactions) and of expectancy (Lawler 1972).

Recently, psychologists have become increasingly concerned with the identification, definition, and classification of the outcomes that are important for understanding human motivation and behavior. The attractiveness of satisfactions varies from individual to individual and for the same person through time.

Hall (1943) saw all human behavior motivated by primary and secondary drives. Primary drives are biologically based. Examples of such drives are hunger, thirst, the need for air, sleep and an optimal body temperature. Actions which restore balance to the system reduce drive and are rewarding. Hall believes certain secondary drives are learned.

Other motivational theorists recognized that man seems to seek many higher order outcomes. For example, Schachter (1959) found that people seek the companionship (or affiliation) of others when they are confused or anxious. People also value equity, they want to be treated fairly by the individual or institution they are dealing with (Adams 1963, 1965). Activity and exploration seem very important to people. Bexton, Heron, and Scott (1954) and Scott (1969) discovered that humans become very uncomfortable in low stimulation environments or tasks. Berlyne (1967), however, noted that too much stimulus may also have a negative impact upon individuals. McClelland (1951, 1961) has extensively studied man's desire to be successful in competition situations (achievement) and has found it to be present in most people. White (1959) has evidence that man is dedicated to learning. His theory is a person copes with his environment for the sake of mastering it. A new or challenging environment or situation tends to evoke this motive. When the situation has been explained and mastered, the motive wanes. A number of psychologists have identified an intrinsic need in man to grow and develop (self-actualization). The work of Maslow is most prominent. Maslow (1954) defines self-actualization as "the desire for self-fulfillment, the desire to become more and more of what one is, to become everything that one is capable of becoming." The self actualizing person is motivated by the sheer joy of using and developing his capacities. Existential psychologists like Allport (1955) and Rogers (1961) identify a motivational concept similar to self actualization, the need for self discovery and for being open to experience.

Psychologists have discovered more and more human need underlying satisfaction. Some people have argued that individuals have several hundred different needs (Lawler 1972). In theory, with each need comes another opportunity for satisfaction. Many theorists have attempted to identify basic classes of human needs for the sake of manageable research. Munray's (1938) classification system contains more than 20 "psychogenic" or "social" needs. His list includes such elements as abasement, achievement, affiliation, aggression, autonomy, counter action, defendence, deference, dominance, exhibition, harm-avoidance, nurturance, order, play, rejection, sex, and understanding (Hall and Lindzey 1957). Maslow's (1943, 1954, 1970) hierarchial system of human needs includes the following five categories: physiological, safety, belongingness and love, esteem, and self actualization. Lawler (1972) listed the following needs for behavior understanding in work environments: existence needs, security need, social need, a need for esteem and reputation, autonomy or freedom need, and a need for competence and self-actualization. Birch and Veroff (1966) identified seven incentive systems that relate to satisfactions. They are sensory, curiosity, affiliation, aggression, achievement, power, and independence.

The various classification systems and various definitions of needs and related satisfactions indicate that the understanding of human satisfactions is still in its infancy. Three conclusions, however, seem appropriate from the concepts reviewed. First, human needs and satisfactions has validity in terms of its relationship to resource planning and management. Second, human satisfactions can be defined at various levels of generality but not specifically. Finally, human satisfactions are sought in different situations to satisfy different needs.

Basic psycho-social concepts used
in recreation research

Attitudes have been scientifically investigated by social psycho-
logists for several decades (Heberlein 1973). Attitude is a mental state
and must refer to some object. Attitudes have usually been differentiated
into spearate components, affect and belief. Affect is an emotional state
which can be extreme. Examples are love and hate. However, most research
projects have affect a rather bland liking or disliking associated with an
attitude scale. In many cases it is more cognative than emotional. It
is the second component of attitude that is defined as cognative, the
belief portion. Beliefs may be determined with a simple true-false
test. However, in most attitude research affect and belief are related.

Underlying attitude research has been the idea that attitudes would
explain behavior. In recreation research, attitude was believed to lead
to a comprehensive understanding of a given recreation population. A
review of the literature shows that there is little evidence to support
the relationship between attitude and behavior. Wicker (1969) reviewed
30 studies and concluded that attitudes were unrelated or only slightly
related to overt behavior. The importance of this research for recreation
policy is clear. Information about public attitudes cannot be directly
translated into knowledge about recreation behavior. Other studies that
have addressed the lack of linkage between attitudes and behavior are
Deutscher (1966), Ehrlich (1969), Lauer (1971), and Heberlein (1973).
The basic reason for the lack of linkage is that behavior is extremely
complex and has multiple causes.

The second major area of research that deals with recreation related behavior has been in the area of motivation. With this area of study, researchers have gotten closer to satisfaction. Some basic motivations have emerged in some studies.

Knopf, Driver, and Bossett (1973) reported on the findings of several studies dealing with motivations of recreationists engaged in different activities. Scales were developed to measure the following motives: achievement, affiliation, exploration, dominance, status, nature experience, risk taking, family togetherness, and fives types of stress mediation. Related to this, Knopf (1972) studied 12 types of recreationists and has found that all score differently on the 10 motivational scales used. Potter, Hendee, and Clark (1973) completed a study of hunting satisfaction that suggests that people engage in hunting for many possible products (satisfactions). Their study determined the important dimensions of hunting satisfaction to be nature experience, escapism, companionship, shooting skill, vicariousness, trophy-display, harvest, equipment, outgroup verbal contact, and outgroup visual contact.

Several studies have examined preferences for different facets of recreation sites and areas. Lucas (1970) and Lime (1971) have focused on camper preferences for specific site characteristics of forest campgrounds. Hendee et al. (1968) and Stankey (1973) studied user preferences for characteristics of wilderness and primitive areas.

An important area of recreation research focuses on preferences for given recreational experiences and the components of those experiences. Wagar's paper (1966) laid the conceptual base for this area. Studies have been completed on both identification of human needs in recreation and the

measurements of expectations of need fulfillment. Moss and Lamphear (1970) demonstrated that some recreational activities fulfill the same human needs. For management this research indicates that it is possible to identify substitute experiences for recreation groups.

Satisfactions of recreationists have not been the focus of studies until recently. Little effort has been made to quantify the outputs or satisfactions in human terms. Most emphasis has been placed on such concepts as day use or total numbers of users to measure productivity of recreation systems.

While psychologists have developed many theories of motivation, they have not been interested in the theoretical foundations of satisfaction (Lawler 1972). The research that has been completed has dealt mostly with the work or job environment.

While the development of satisfaction theories is in its infancy, four basic approaches have been suggested. Satisfaction is related to fulfillment, discrepancy or the difference between perceived and actual outcomes, equity, and two-factor theory (Lawler 1972). Other related theories have argued that recreation reduces stress, develops, maintains and protects self esteem, develops social identities, is an exercise in power or creative self-fulfillment (Driver 1976).

Approaches used in recreation behavior
research

Chubb (1975) classified the variety of recreation behavior studies into different classifications. These included method studies used to test particular research approaches. General site surveys are oriented toward

a specific management area while activity studies have been oriented toward a specific recreational activity. Comprehensive participation studies have included a broad spectrum of activities and have not been concerned with a specific place. A more sophisticated type of recreation research approach has been carrying capacity studies. Commercial organizations have taken a market oriented approach to recreation user research. Chubb also categorized recreation behavior studies by method. One of the simplest is counting methods. A more elaborate counting method would involve registration. Direct observation of recreation behavior is an old method now modernized with television or photographic equipment. Self-administered questionnaires are the most common method of gathering data on users. Telephone interviews and face-to-face interviews are two elaborations of the questionnaire method.

Role of social and psychological research in recreation planning

As pressures for development of the public land increase, public land planners and managers bear a greater burden in ensuring that their decisions concerning the use of our natural resources will maximize the benefits to the public. Recreational uses of public land are no exception. One method for determining the public benefit is to assess the satisfactions provided the users through their activities.

Other planning and management issues hinge on very technical physical or biological data as well as political information. Recreation planning and management can solve some problems by going to the objective of the program, the public land outdoor recreationist. One way to judge successful programs for outdoor recreation is to determine the level of user

satisfaction. In theory a person could examine current users of the public lands, determine the origins of satisfaction and dissatisfaction. The land manager could then provide more sources of satisfaction and in turn reduce the causes of dissatisfaction. Some individuals see the use of behavioral information and user attitudes as important planning and management tools (Schreyer 1977). User studies are seen as helpful in controversial areas and as a democratic means of determining public projects.

The role of behavior research and recreation planning

Several researchers have tried to identify the relevant attributes of recreation experiences for planning and management (Hendee et al. 1968, Potter, Hendee and Clark 1973, Brown 1975). Other researchers have focused on the analysis of specific attributes of the recreational experience (Stanley 1973, Shafer and Mietz 1969, Peterson 1974). These studies explain the specific components of certain recreational experiences. For the planner, these results can be helpful in writing management objectives.

Driver (1972) advocates eight potential values of the socio-psychological approach for the manager: (1) to assess the extent and situational context of the resource and to identify complementary, duplicate and conflicting uses, (2) to protect the characteristics of the resource and facilities that give these resources their recreational worth, (3) to provide an appropriate level of development and management to make the recreational services available, (4) to provide opportunities to meet the needs of the recreationist that lead to his selection and use of the resource, (5) to enhance the experience of the user, (6) to appropriately publicize the program to meet the objectives of management,

(7) to understand where the manager fits within the total decision process and the hierarchy of the organization for which he works, and (8) to assist in creating and designing social institutions adequate to the task of meeting changing needs of our time.

Problems of psycho-social research and its use in recreation planning

Chubb (1975) discusses the problem of each behavior research method. These include the lack of standardization and lack of historic or continuing research. He has also identified problems with sample size, structure of the survey, and problems with the wording of the questions. Chubb also felt that serious problems remained concerning the imbalance between geographic areas, the application of research in one area to another, and lack of recreation research leadership.

Another problem of the majority of recreation research in this area has been the examination of only current users. In a sense this gives a snapshot of the use. It is a static look at a dynamic situation. Differences within the current recreation user population may not be great because the diversity has been selected out. It is important to consider the input from nonusers of a recreation resource. Trying to determine managerial options through analysis of current users may be no more useful than older more unscientific methods.

Another problem of most research has been pointed out in a recent journal article (Tinsley, Barrett and Kass 1977).

> Studies have generally involved only a limited number of
> need dimensions. Hence, they have failed to generate the
> breadth of information required regarding the extent to
> which leisure activities differ in their need satisfying
> characteristics.

These authors, while critical of some research completed, feel that
recreation activities can undoubtedly contribute to the life satisfaction
of an individual. The range of activities studied needs to be expanded
and confirmed in the next round of research.

A recent article on camping illustrates another problem of determining
satisfactions of recreationists. Hollender (1977) researched the moti-
vations of campers but also mentions their satisfactions as well. While
it is possible to infer the satisfactions derived from the experience
based on the camper's motivation, this indirect method is probably not
as reliable as actually trying to measure and determine the satisfactions.

London et al. (1977) deals with the reason to determine those
recreation activities and groups that may substitute for one another.
One of the important basis for grouping activities is on the basis of
the needs that they satisfy. Identification of needs satisfied by par-
ticular leisure alternatives can aid in providing a set of activities
that will attract the most users at optimum cost. Its implications for
planning are obvious. However, most past research has grouped activities
according to participation rather than the satisfaction of needs.

The evolution of psycho-social research
for outdoor recreation

Until recently, articles on the psychological or social aspects of
outdoor recreation were relatively rare. However, interest has recently
been increasing in the motivations for participating in outdoor recreation
and the satisfaction associated with it. One reason for the increased
interest in social and psychological aspects of outdoor recreation has
been the rapid increase in recreational use. Some recreation areas have

reached their saturation point. Demand continues to increase. At one extreme the land management agency can let the use continue unabated. At the other extreme the management can severely restrict the use of its areas. Neither option is feasible, so managerial and planning action somewhere between these extremes is required. To make these decisions, the planners and managers must have considerable information on the characteristics of the users, their motivations for coming to the area, their perceived requirements of an area, and the types of interactions associated with a particular area that produce maximum user satisfaction. Researchers have been attempting to gather information about various kinds of user characteristics and satisfactions but much more needs to be known before decisions about managing outdoor recreation areas can be made with any real confidence.

The earliest studies related to psycho-social aspects of outdoor recreation concerned surveys of the characteristics of users. While the early studies were useful and still provide important information for the planner and manager, these studies led to the next question. What were the motivations of the outdoor recreationists? Some of the popular concepts have focused on urban stress, the need to get away from cities and a change in pace. However, while these explanations are valid for many or even most recreationists, they have not explained the behavior on some stress seeking activities such as hang gliding.

The next general area of research focused on the perception of the user. What do specific recreationists look for or expect when they visit an area? This line of research could lead to answers as to the requirements to satisfy the recreationist. Stankey (1972) examined the attitudes

of wilderness users toward features of the areas that were considered important. Litton (1972) attempted to define the aesthetic dimensions of the landscape and to establish appropriate "aesthetic criteria." Shafer and Mietz found specific features aesthetically satisfying to hikers. Such information then can be useful to the planner and manager in laying out trails. In this example the researchers found that the hikers preferred large rock outcrops, trails located in natural openings of the forest and trails that followed watercourses. Cicchetti (1972) pointed out the role of personal differences in outdoor recreation management preferences. His work and others points out the importance of expectations of users and its relationship to satisfaction.

Recent recreational behavioral research

The purpose of this section is to review current behavioral research. Some underlying reasons or experience expectations users may hold for any given recreational activity are included.

Birch and Veroff (1966) identified seven motive needs they felt should be studied: (1) sensory, (2) curiosity, (3) affiliation, (4) aggression, (5) achievement, (6) power, and (7) independence.

In a closely related study, Birch identified six activity typologies which relate primarily to recreational behavior: (1) symbolic labor, characterized by quest for trophies, (2) expressive play, activity that momentarily destroys the stability of perception, i.e., water skiing, (3) subsistance play, fulfilling ordinary demands of camping, i.e., cutting wood, (4) unstructured play, creative and existential expression of the individual, (5) structured play, clearly defined rules, i.e., games, (6) sociability play, forms of human action. Birch suggested

that distribution of people into category types should be based on whether the activity was carried out typically by men, women, or both. However, two shortcomings of this study were identified by Hendee, Gale, and Catton (1971). First, the categories were established by observation of the researcher only and not by interview with the participants. Second, the study did not indicate the relative satisfaction that the participant gained from each activity, and that observations are limited by properties of the environment such as size of the campsite and composition of the camp party.

Hendee et al. (1971) modified the Birch approach by utilizing a questionnaire to obtain stated preferences of the public rather than limiting their study to only personal observations. This study indicated that the stated preference for recreational activities could be linked into five conceptual typologies: (1) appreciative-symbolic, activities directed toward appreciation of features of the natural environment; (2) active-symbolic, the quest for trophies; (3) passive-free play, activities requiring little effort; (4) social learning, combines clearly social activities such as visiting or singing; (5) active expressive, activities that do not require use of a forest setting, such as swimming or motorcycling.

Potter, Hendee, and Clark (1973) conducted a study to identify the dimensions of hunting satisfactions. Results of this study supported Driver's contention that human motivations were complex and that no single motivation, such as "game bagged" could be singled out. Potter et al. found that eleven dimensions of hunting motivations could be identified.

In decreasing order of importance as discussed by the hunters, they were: nature, escapism, companionship, shooting, skill, vicariousness, trophy display, <u>harvest</u>, equipment, outgroup verbal contact, and outgroup visual contact. Surprisingly, hunters ranked actual <u>harvest</u> eighth in overall importance, thus dispelling the idea that the primary rationale is the "game bagged." Lime (1972), in his study of campsite selection factors used by campers in Superior National Forest in Minnesota, again found a variety of definite reasons for selection of a campsite. Included were fishing availability, uncrowdedness, remoteness, within sight of a lake or stream, and a small campsite.

Knopf, Driver, and Bassett (1973) reported the findings of several University of Michigan studies dealing with motivations of different recreational activities. Scales were developed to measure achievement, affiliation, exploration, dominance, status, experience, nature, risk taking, family togetherness, and stress mediation. Driver (1976) developed scales to test stress release, autonomy affiliation, self awareness, action, status, learning, solitude, and nature study.

Roggenbuck (1975) used a multidimensional scale to measure nine motives for river float trips: (1) stress release, (2) autonomy, (3) affiliation, (4) self awareness, (5) status, (6) solitude, (7) learning, (8) nature, and (9) action. Results of this study showed that in actuality only seven motives existed with learning and nature being combined into one motive factor, and stress release combining with solitude to form another factor.

Driver and Brown (1976) note that the selection of particular recreational activities is dependent upon a host of factors in the individual's physical and social environment. Previous experience, particularly a satisfactory experience, is important. Every person enters into a recreation activity with certain expectations about that particular experience. Expectations are usually defined as what the person hopes to receive from the upcoming experience. Individual characteristics or background will shape this expectation. The range of expectations for any group will be broad.

According to the theories put forward by Driver and his associates, the difference between expectation and perceived reality is important. Again the individual perception of reality varies, yet is important to satisfaction. If expectations are not met then dissatisfaction may result, or even stress. If someone wants solitude, the presence of others prevents that. If another person wants an experience with nature, yet the area has well-developed facilities, his needs are not met.

The concept of matching groups of expectations with a resulting group of satisfactions has been presented by Knopf (1972 and 1973). Thus recreational opportunities are matched with specific experiences and this leads to visitor satisfactions.

General treatment of recreation satisfactions

One of the earliest recreation user satisfaction studies was the Outdoor Recreation Resources Review Commission's Report #5. Chapter three of that study based on nearly 11,000 surveys in 24 different recreation areas, provided a national view of recreation satisfaction.

The study gave a view of the types of activities people participated in and evaluated the service available at recreation sites. Personal internal satisfactions were not considered, although the study was an important start in this type of work.

Another early article on recreation and satisfaction was by Margaret Mead in ORRRC Report #27. She discusses leisure time in America and the general individual and family satisfactions that come from recreation.

In <u>Mass Leisure</u> by Larrabee and Meyersohn, leisure is viewed as a social phenomenon. The authors point out the "many absurd . . . not least (which is that) it provides anxiety . . . over a subject traditionally associated with east and relaxation." This paradox is one of the main themes of the book.

In <u>Man and Leisure: A Philosophy of Recreation</u>, Brighthill discusses first the reasons for increased leisure, automation and industrialization. Within a philosophical frame the creative and cathartic uses of leisure in a contemporary society are described. The author contends that the increased use of leisure has not resulted in creative use of it, although he sees recreation and leisure as a means toward a creative life. Like many of the books of the early 1960's, this one regards leisure and recreation in general terms. Specific activities and satisfactions are not approached.

Guenther Leuschen in 1963 was one of the first sociologists to begin breaking out social differences related to different sports activities. The author found a relationship between high efficiency in sports and upward mobility. Also he noted an orientation to group affiliation among those who had a high overall skill in sports such as soccer.

Douglas Sessions in a 1963 article in <u>Social Forces</u> reviews 48 studies related to outdoor recreation pursuits. As has been the case with many studies of this type, the focus was on relating age, income, education, occupation, residency with the type of recreation activities.

The 1962 National Recreation Survey of the Outdoor Recreation Resources Review Commission did the same thing on a national scale. Considerable information was gained that laid the foundation for thinking and research on satisfactions or benefits.

By the mid-1960's, sociologists were beginning to deal with some of the general satisfaction of outdoor recreation. Shewak Bhojraj, a sociologist from India, discussed the function of recreation in fulfilling psychological needs as the expression of aggression creativity and certain "passive desires."

In 1964 Peter Etzkorn evaluated public campground users and determined that rest, relaxation, and meeting congenial people were the dominant goals of this group. This study represented one of the early sociological workers who began looking at the satisfactions of specific recreation activities. He compared public campground users with wilderness camping. He regarded the public campgrounds as routine activities practiced by people with routinized jobs. This contrasted with wilderness campers who had more creative jobs.

Yoesting and Burkhard noted that the number of recreation activities practiced as an adult is related to the number of activities practiced as a child. This illustrates the importance of basic social and economic and other information that has been the hallmark of recreation research in the 1960's. Later research then provides linkages and explanations

that serve to explain or enhance data gathered earlier. Thus some of
the basic background material may be useful to the manager at a later
date with the publication of additional research. Also, if childhood
experiences and behavior are important, this has a planning application.
For example, this study noted that the parents that instill appreciation
of the out-of-doors impact the behavior and attitudes and activities
when the child grows up. If childhood experience is the key factor,
then planning agencies can predict future demand and develop programs
such as environmental education that will re-direct future demands and
activities.

Another theoretical paper which illustrates some issues involved
in recreation satisfaction is one by Iso-Abola (1976). The author
suggests that low achievers in work situations compensate with rec-
reation activities. If this is true, the author points out the importance
to society of dissatisfied individuals finding a role and place in
society. It places the responsibility of recreation managers and planners
in a larger role than only managing a natural reosurce but also providing
an important product for the nation's mental health.

A study by Gunn (1972) points out the feasibility of substitution
of outdoor recreation activities. She concluded that recreation was a
needs-fulfilling behavior and that replacements could be found for some
activities. It's implications for planning are obvious.

The idea that some forms of outdoor recreation are the result of a
job dissatisfaction was supported by Schester's (1975) dissertation
research. This research sampled over 500 workers by a questionnaire.
He found that dissatisfied workers have a greater affinity for leisure

and define themselves through their activities. These relationships were not influenced by sex or occupational level, indicating that not only blue collar but all dissatisfied workers will try to express themselves in leisure and outdoor recreation activities.

Common psycho-social satisfactions

While specific satisfactions are difficult to determine, several general areas are clearly illustrated by the literature.

1. <u>Physical well being</u>. Research has given us ample proof of the contribution of physical exercise. When work and even the demands of daily living make fewer contributions to muscle tone or physical fitness, some-times the only motivation for healthful exercise comes from the publicized problems of obesity or the stimulation of a recreation outlet (for example, Bortz 1959, Cowell 1960, Espenschade 1960, Johnson 1960, Theobald 1967).

2. <u>Emotional balance</u>. Psychologists tell us that we all have certain basic needs which must in some manner be satisfied if we are to maintain our physical health and psychologically integrity. Wholesome leisure outlets should be a stabilizing and creative force, yet there is a growing incapacity for individuals to find Maslow's self-realization or self-actualization and emotional security in leisure. Psychiatrists Alexander Reid Martin, Karl and William Menninger and Paul Haun have been perhaps the best supporters of recreation as a positive force in good mental health. Dr. Ed Greenwood forcefully linked recreation outlets as a positive force for mental health (for example, Hendee 1969, Layman 1960, Martin 1962, Martin 1963).

3. <u>The need to find identity</u>. Peter Martin (1967) makes a forceful case for the use of leisure to develop identity in disoriented patients.

Keniston's research (1965) on Harvard undergraduates linked alienation, free time, and the problem of social identity.

The retirement literature also supports the idea that when the work years vanish, the retiree must "become" through his leisure pursuits (for example, Bortz 1959), Havighurst 1954 and 1961).

4. _Regaining a sense of community_. West and Merriam's (1970) research on outdoor recreation suggests that such activity contributes to family cohesiveness. Other studies support the role of recreation in social solidarity (for example, Berger 1963, Burch 1969, Dubin 1963, Kostelanetz 1973, McNeil 1961, Toffler 1970).

5. _Learning_. Leisure outlets can provide a chance for intellectual development throughout life (Hutchins 1971).

Research on children's play indicates cognitive, perceptual, and language development. The leisure of retirement gives the older American a chance to explore and add to his knowledge (Moffit 1972 and Piaget 1962).

6. _Self-image, self-esteem, self-fulfillment_. Self definition and status recognition through leisure pursuits have been supported by several studies (Neulinger and Breit 1971, Shepard 1974) yet Maslow ties self-actualization only to work. "The only happy people I know are the ones who are working well at something they consider important. This is a universal truth for all my self-actualizing subjects" (Maslow 1973).

7. _Social integration_. Martin (1967) indicates "Through play the child learns right from the beginning not only how to get along with himself but with another human being." Our enjoyment of recreation pursuits is conditioned by their availability and our capacity to profit from them. There are, nevertheless, values inherent in many recreation activities which provide assets toward democratic living. As discretionary

incomes increase, recreation can be a means of social integration, as many socio-economic classes are mutually accessible in the theater audience or in the basketball stands. Recreation seems to be contributing to a certain classlessness. There is evidence of a narrowing gap in recreation choices between rich and poor as more enthuasiasts at every economic level indulge in golf, sailing, tennis, classical music, horseback riding, and opera, once considered the exclusive pasttimes of the upper socio-economic group (Clark 1965, Havighurst 1964, Whyte 1955).

8. <u>Compensation for voids in other aspects of life</u>. The compensatory values of recreation are as old as catharsis theory. Recreation outlets have been explored as a substitute for intrinsic job satisfaction (Strauss 1974) or compensation for blocked motives (Witt and Bishop 1970).

9. <u>Personality development</u>. "Play is the way the child explores and orients himself to the actual world of things, animals, structures, and people" (Dubin 1963). It is also the means of testing behavior without irreversible repercussions.

10. <u>Arousal seeking</u>. Michael Ellis (1973) makes a good case for recreation as arousal seeking, the need to generate interaction with the environment, physical or social.

Specific recreational activities

The quantity and quality of research on the satisfactions of specific recreational activities varies greatly. In general, sufficient research has been completed on activities such as hunting, hiking, camping, and backpacking to draw some general conclusions. Newer activities such as sand sailing, hang gliding and jeeping are more difficult to evaluate. A general review of the literature (popular) on hang gliding suggests that the activity has satisfactions that fit into general concepts used to explain other more traditional forms of recreation. The popular literature refers to the exclusiveness of the activity, its freedom and vicariousness.

The report will elaborate on some of the general concepts in recreation research concerning social and psychological aspects of recreation. Due to the nature of the research material, this will not be limited to satisfactions but will include motivations and expectations. Specific studies and the conclusions will be categorized into common satisfactions of outdoor recreation. Groups of activities that have common satisfactions will be identified as well as differences. Basic compatibilities and incompatibilities will be identified to the extent that the literature is available.

Camping satisfactions

Bultena and Klessig (1969) established a model to determine satisfaction from camping. They established five dimensions of camping to investigate. First, they looked at camping as a desire to secure specific benefits from a resource. This is contrasted with those who only want

a change in scenery. Second, they felt that a study of camping should
consider style, whether the recreationist practiced simple or comfort
type camping. Drawing from Hendee's (et al. 1968) work with wilderness
users, they felt that style would lead to values and satisfactions.
Third, their model of camping satisfaction included a comparison between
activity levels of campers. Bultena and Klessing felt that some campers
were active (i.e., canoeist, backpacker) while others were reflective and
exerted little physical effort. Another important element they identified
in this category was the person who used camping for a vicarious relation-
ship with pioneers. A fourth area was the motivation of campers.
Here a comparison was drawn between campers who sought solitude vs. those,
who were looking for social experiences. The final dimension of camping
they identified was camping as an end in itself. This group may find
satisfaction from the display of camping and its equipment, being in the
out-of-doors--or mastering the craft of camping. In all of the five
dimensions they, like Driver, felt that satisfaction was determined by
the campers' aspirations, compared to the perceived reality of their
experience.

For the recreation planner this paper and others related to camping
illustrate a problem for practical application. It is possible to state
that some common satisfactions from camping are play, symbolic activities,
enhancement of self confidence, promotion of family and social solidarity,
and solitude. However, individuals may seek one or only a few satisfactions
that may not be compatable with other people or other activities.
A modern developed campground may satisfy those who want to socialize
and display their equipment and skills. It may satisfy the person

seeking comfort. It will not satisfy the individual seeking solitude, nature, and a primitive experience.

Like other forms of outdoor recreation, a continuum of opportunities is needed to satisfy the needs of a pluralistic society. Of course the entire range of opportunities need not be offered by one agency or one geographic area. However, the provision of only modern campgrounds seems inadequate. Walk-in campsites and backcountry camping areas would serve to satisfy more needs than one type. Efficiency in facilities management will often conflict with the desires of a broad spectrum of recreationists. A large campground may be efficiently managed but not meet as many satisfactions as several smaller areas.

Hang gliding and stress seeking satisfactions

Hang gliding, sand sailing, motorcycling, and dune buggying may attract some people because of the risk element. Dunn and Gulbis (1976) dealt with the general area of risk activities. Their study ranked 27 risk activities according to perceived participant risk. Of these, hang gliding ranked the highest (88), backpacking the lowest (9). Motorcycling was ranked at 42, motocross 21, off-road vehicles 26. Dunn and Gulbis point out the importance of professionals keeping abreast of emerging high risk activities.

The interest in high risk outdoor recreation is perhaps illustrated by a major article in _Newsweek_ (1975). This article quoted participants and scientists regarding the satisfactions of high risk sport. Some deal with such activities as a contrast to sedentary urban life, others to the need to master a skill. Still others regard such activities as a suicidal

drive. Like other activities, an array of satisfactions and motivations are associated with high risk recreation. Specific research is not available.

Popular literature of hang gliding gives some insights into the satisfactions (certainly the dangers are publicized (June and July 1977, Hang Gliding)). The attraction, while unresearched, is illustrated in Ground Skimmer, a short article on Tom Peghiny.

> What is it about hang gliding that appeals to you? Flight, freedom, all the old adages about the sensation of being a bird. The sense of adventure. The ability to explore the forgotten frontiers of technology. Flight, flying and aerodynamics have always fascinated me. It seems inconceivable that invisible, tasteless, odorless, and seemingly nonexistant air could actually support birds and aircraft. Flying held a certain aura of magic that, if mastered, could fulfill an ancient dream. I could see, feel, experience and know things that others could only dream of. From this early fascination, I have pursued flight to where I am today.

In response to "Do you mind flying in front of crowds?" Peghiny answered, "No, I love it." That response would be categorized by a social psychologist as "display."

In a letter to Ground Skimmer by D. Youmans, the following comparison was made:

> Rock climbing? That's popular today and the similar- ities between it and hang gliding are striking. Both appeal to a relatively small group. Both involve a certain degree of risk. Both require judgement and skill to reduce those risks. And both are in the early stages of becoming popular sports.

In a short note in Ground Skimmer (Sept. 1976, p. 41), there was the following:

The glider becomes an extension of my body, forming
a flying unit guided by my mind. Then, mentally I
become at one with the air and harness its currents
to remain aloft and travel about. As I fly I can
float around, relaxing, or testing my self, challenging
the unknown. Flying is many things to me, even a
way of life, and a hang glider is my tool or ticket
to flight.

Other references are made to man's dream of flight, the freedom of hang
gliding, and fantasy and its spiritual expansion. Others refer to the
novelty of the sport. As with other high risk sports, the themes of
challenge, fantasy adventure, relaxation, escape and life style emerge
from the popular literature of hang gliding. Hang gliding even has its
poets (Gordon 1976):

A quickened pulse, a hurried breath,
A glance from side to side,
Begin the endless moment,
An eagerness we hide.

We penetrate, we enter in,
We taste the glowing thrill,
The upsurge of a warming wind,
We rise above the hill.

Beneath, the land does not exist,
We have a home no more,
A quiet exhilaration sings,
Over the Earth we soar.

This is the time we deem as ours,
A space we cannot share,
Except by giving from ourselves,
The openness of air.

Outdoor recreation as a form of stress seeking has been fairly well
studied compared to other activities. One of the best insights is a
small book called <u>Why Man Takes Chances</u> (Klausner 1968). One of the
useful concepts for planners of this book is that it provides a rationale
for an activity that otherwise appears irrational. It is advocated that

legitimate stress seeking is healthful for the individual and society.
Also it appears that stress seeking is usually carefully planned and is
internally imperative and satisfying. The phsyical environment is often
of little importance to the stress seeker. For planning this is useful
in that the environment for stress seeking is less than a secondary condition.
It is almost irrelevant to the stress seeker. The activity and its
satisfactions are everything. The environment is nothing.

Risk taking satisfactions ·

One concept that has been advocated is the cathartic effect of certain
outdoor recreation activities. The basic idea, often presented by
psychologists, psychiatrists, as well as lay people, is that the expression
of aggression, hostility, or rage reduces the consequent probability
of the occurrence of aggressive behavior. It is often labeled "catharsis"
or a "cathartic effect" and attributed to some recreation activity.
Kaplin (1975) tested this idea with over 100 students. This was done
in part because some psychologists do not accept "catharsis." Indeed,
some researchers, such as Aronson (1972) and Mallock and McCandles (1966),
believe that catharsis leads to increased, not decreased aggression and
hostility. Kaplin's research supported the latter concept. He concluded
that distraction rather than any confrontation or outward expression of
anger would avoid outbreaks in hostility. His study showed the opposite
of catharsis effect. Those subjects permitted expression of their
anger produced the least anger reduction. While the study was not
directed toward recreation per se, it has possible insights and application
to recreation planning.

Psychologists have been investigating the relationship between high risk recreation and social characteristics. Refering to participants in such activities as sky diving and snowmobiling, Carlson and Klein (1971) concluded "these individuals have low levels of education and income associated with such occupations . . . tend to be uncomfortable with abstractions and impatient with long range planning." It would appear that prestige and social acceptance also contribute to participation in high-risk activities. Most high risk recreationists experience a process of socialization from an early age, whereby they are exposed to the behavioral patterns, customs, rituals, and codes of the sport. The literature is sparse on the subject. However, it appears that some lessons for land planners are available in the literature. If behavior patterns are learned and aped, then it is important that the adverse activity patterns, unacceptable behaviors, and dangerous activities are broken through planning, management, or enforcement.

Hayes (1974) warns that the incompleteness of information on risk activity should not justify avoiding decisions. High risk recreation activities are considered an area where there are more accidents and less known and being done than any other accident area. Many have regarded the risks involved as acceptable relative to the health benefits accrued.

An excellent article was Greenberg's (1977) dealing with the attraction of high risk outdoor recreation activities. The author relates opinions that risk taking is a product of an unsatisfactory work environment and the American emphasis on performance and competition. In addition, the gratification of motorcycling and other high risk activities is immediate. The activities provide a sense of physical mastery, control and assertion.

High risk outdoor recreation activities often have a natural history of their own. The pattern is usually one of a small initial introduction or articulation. Next comes an expansion phase. The satisfactions, special language, life style and subculture emerges at this time. Equipment is developed and elaborate ritual often is an important element of satisfaction. Early adaptors usually lament the third stage usually viewed by the purist as an era of corruption. In this stage the sport may be commercialized or its original satisfactions distorted by publicity, hangers-on or a type of camp following. A reading of the popular literature of bow hunting, hang gliding, rock climbing and to a lesser extent backpacking illustrate this pattern. Letters to the editor often reflect the purist concern for the "decline."

Depending on your perspective, the final stage of this evolution is a decline era. At this point that form of outdoor recreation is no longer fashionable, its growth declines or stagnates.

One of the best articles on this process involved surfing (Irwin 1973). However, an understanding of the process is helpful to recreation planners and managers. Various participants in an activity will view each stage of the history of the activity differently. Each will have a different set of expectations. Because of the necessary time lag in recreation planning and management, resources might be directed toward an activity, but after corruption or decline has begun. Another problem is projecting growth based on the expansion phase of an activity. In either case it is important to understand the life cycle of activities and anticipate changing patterns. Present day communications have accelerated the process as well as complicated the problems of planning.

Backpacking and related satisfactions

Natural settings and recreation activities such as backpacking and horseback riding have been studied for their psychological benefits. A study of 1,364 wilderness users in the Pacific Northwest (Hendee et al. 1968) found that some attitudes identified with a purist wilderness user can be described as spartanism, antiartifactualism, primevalism, and humility in relationship to the natural environment, outdoorsmanship, aversion to social interaction and a desire to escape civilization. Consistent with these findings, a study by the Outdoor Recreation Resources Review Commission (1962) cited the desire to exit civilization and obtain an esthetic-religious type of experience as dimensions that dominated the appeal of wilderness. Shafer and Mietz (1972) asked wilderness users in the Adirondacks and White Mountains to indicate the importance in a wilderness experience of five general qualities of any recreation experience: physical, emotional, esthetic, educational, and social. The preference ordering obtained by the method of paired comparisons showed esthetic and emotional qualities first and second in importance, with social aspects being least important of all.

Scott (1974) summarizes dramatic wilderness experiences reported by several noted writers and proposes for study the possibility that the "peak experiences" involved in that ultimate psychological growth toward "self-actualization" (i.e., Maslow) may be fostered by a wilderness setting.

Driver and his associates (e.g., Bassett, Driver and Schreyer 1972) have researched factors influential in a person's choice of recreational experience. Their model of recreational behavior suggests that a person's choice of recreational environment and/or activities is strongly influenced

by problem states that either cannot be, or for some reason are not, resolved in his nonrecreational environments. They feel these problem states define unmet needs. The recreationists they have studied closely associated with wilderness use (i.e., primitive camping or stream fishing) have cited as highly important needs to escape from urban surroundings, to explore, and to experience nature. In comparison to other recreationists, they have a low need for affiliation. Other research (Buetena and Taves 1961, Cain and Buckly 1964, Lucas 1964) has also supported what appear to be some consistent rewards gained from wilderness use or activities including the escape from urban areas and problems, the opportunity to experience nature, tranquility and exploration or adventure.

Rossman and Ulehla (1977) expanded on early work and determined that rewards from recreation increased regularly as one went from indoor environments to outdoor recreation facilities to roadless wilderness. As with other research, they found natural environments as necessary for obtaining many rewards.

Another dissertation by Slocky (1973) found a 5-day wilderness trip was a dramatic, positive experience for many psychiatric day-care patients. The wilderness experience accelerated the therapy process, reduced obsessive thought patterns, decreased fears of dependency, increased self esteem, self confidence, and decreased feelings of helplessness. The author felt that a wilderness or undisturbed natural environment provided an experience basic to psychological health and growth.

Retaining wildlands in the face of population increases, second home development, oil, gas, and mineral development is not easy. Some authors predict adverse reactions and have stated   that the impacts of opportunities

lost will not be restricted to recreation enjoyment. Some have speculated that if recreational needs are not met by legitimate means, this creates pressures for securing them by illegitimate or deviant means. While no scientific evidence is available, Rossman and Ulehla (1977) speculate that the means might be mind-expanding drugs, cultism or other socially disruptive activities. Like the motocross rider, it was felt that adequate substitutions would not be available to satisfy the wilderness or purist type recreationist.

Other writers such as Douglas (1950) have talked in general terms of the adventurous challenges that can be obtained in coping with the wilderness. He also speculated on the adverse behaviors that might occur, if such activities occurred in urban environments. However, it must be noted that little evidence supports this concept. Whether it is accurate will have to be established with additional research.

While no scientific research was found on hang gliders and their satisfactions, research was available on skydivers. For example, Hymbaugh and Garrett (1974) found that skydivers prefer novel experiences, volunteer frequently for the unusual and generally have more unconventional and exhibitionistic behaviors.

Two researchers (Wiesner and Starkly 1973) tested the stereotype that wilderness users had a high degree of physical fitness and stamina. More college students were tested and it was found that backpackers were not different in fitness and strength from non-backpackers. However, they had a more positive attitude toward fitness.

O'Connor (1970) found that hikers had high scores in autonomy, exhibition, dominance, change and achievement. Planning efforts could be directed to maximize these benefits.

The importance of these findings for recreationists such as back-packers, hiking, and horseback riding are easy to relate. Many of the satisfactions will be sought after and important to these groups. While high quality research is not available for all these users, it seems reasonably safe to infer some of the results of wilderness users to related outdoor recreationists.

Hunting satisfactions

One dissertation on hunting (Copp 1975) found that waterfowl hunters generate high levels of frustration. Considerable blame shifting occurred when hunting was unsuccessful. However, occasional "peak" experiences occurred with very high levels of satisfaction. Like other outdoor activities, hunting was a game, a created "world set apart" by means of dress, behavior codes, and language. As with other activities, hunting has an aura of specialness, secrecy and adventure.

A more useful article on hunters was Plummer, Erickson and Graves (1975). They found that hunters love the outdoors, enjoy outdoor activities, engage in fantasy adventure and have a phsyical conflict orientation. The hunter sees himself as masculine in a traditional sense and a rugged individualist. He wants to exert control over others, yet is self-indulgent and needs outside control. He lacks responsibility and responsiveness to national endeavors. He ignores or fails to see society at large. Certainly this study raises questions as to the feasibility of the manager or planner appealing to sportsmanship or to education to solve problems concerning hunters. The portrait of this study would help explain the lack of success the wildlife management

profession has had with educating the hunter in management principles.

Motorcycle satisfactions

Stone (1974) saw young motorcycle riders receiving great satisfaction from power, speed, acceleration, and violence. However, he noted that the individuals control over the violence was an important satisfaction along with the demonstration of skill. He noted that the motorcycle became an extension of the body, and that total exposure to the environment was important.

An excellent example of the continual refining and defining of outdoor recreation satisfaction is the article by Martin and Berry (1974). They provide a detailed look at a motorcycle subgroup: the motocross racer. This illustrates the future research pattern of a refinement of information on the satisfactions of various outdoor recreation subgroups. Like other high risk sports, the motocross racer is action oriented. They point out the important ties between our society and culture of large and emerging outdoor recreation patterns. Outdoor recreation are not autonomous events, removed from the mainstream of life.

Motocross racing is seen as a working class sport. Based on three years research of a racing club, the authors found the members without exception working class. The motocross racer is described as "singularly consumed by the art, craft, techniques, and challenge of motocross racing." The quest for competition and victory is dominant and the motocrosser will invest most of his time and resources in its pursuit.

The authors draw a clear definition between the expressive riders who relates to their machines as an extension of their own personalities

(i.e., the machine is a means toward self expression) and the motocrosser who views his machine as an instrument (i.e., the machine is an example of utilitarian simplicity). Between the two groups the expressive riders specialize by taking trips and admiring each other's equipment. The motocross racers concentrate on technological aspects of their machines. .

The authors found the working class males concerned with motocross racing held a deep appreciation for rugged individualism, competition, achievement and success. Many felt that the opportunity to express these values could only be found in outdoor recreation, certainly not in a work environment. Job descriptions and controls have standardized and delimited the freedom and autonomy of workers to prove themselves.

This report illustrates several points for the outdoor recreation planner. First, generalizations about specific groups of recreationists like motorcyclists may not hold for subgroups. This article describes one subgroup in detail and second group less precisely. Yet there are probably several other identifiable subgroups under the category of motorcycling. The research into various activities is new and not entirely refined. A planner may draw general conclusions but may not be able to apply specific conclusions to some individuals or areas. When a minority of motorcyclists such as the motocross racer has such all-consuming interest in their activity, the land manager or planner who excludes them has a serious problem. Substitute recreational activities will not satisfy such a population. Their needs will have to be met on public lands or state or private recreation lands. In any case it is important to meet their needs.

ORV satisfactions

Although the recent recreational behavior research is useful in identifying overall experience expectations for a wide range of recreational activities, only a limited number of studies have been directed specifically at the off-road vehicle phenomenon.

Peine (1972), in a study of ORV users in Tucson, Arizona, found that users could be stratified based on three primary orientations: (1) vehicle oriented users, (2) activity oriented users, and (3) land oriented users. The first of these, the vehicle oriented user, considered his vehicle to be an end in itself, while the land oriented user used his vehicle as a means to an end; namely, enjoyment of natural surroundings. The study showed that the vehicle oriented recreationist was looking for an area to test his vehicle while the land oriented recreationist was searching for remoteness and new scenery.

McCool et al. (1975) conducted a review of problems caused by ORV use in the Little Sahara Recreation Area of central Utah. General observations by these five researchers led to the hypothesis that three or possibly four vehicle user types existed in the area. Those activities identified were: ORV play, ORV competition, and ORV explore. Associated with each type of user, the researchers further hypothesized, is a package of rewards which the user expects to gain from participation in that activity. Each user, therefore, expects a certain experience from his machine, the environment, and social relations. Again, this reflects the proposition of Driver's that man is goal oriented in pursuit of his recreational activities.

A California Department of Parks and Recreation ORV study report
(1975) lists five categories of satisfactions: aesthetic, skill building,
psychological, social and supportive. The aesthetic benefit of ORV's is
a satisfaction that is often unappreciated by non-ORV users. However,
the ORV is a means to enjoy the environment and remote areas (perceived as
wilderness to the ORV user). As with other activities, the development
of skills and demonstration of skills is a second important element of
some types of ORV's. This satisfaction is often contrasted with a work
environment where skill demonstration is not available.

Psychological satisfactions are always difficult to assign but are
a definite value to ORV users. A strong sense of freedom, self-reliance
and escape are often associated with ORV use. Social values and supportive
values are both important to the ORV user. A sense of belonging, compan-
ionship, as well as a means to camp or learn about the environment are
all part of the experience of using an ORV. For the recreation planner,
regulations that interfere with the ORV's sense of freedom are a roadblock
to his satisfaction. Any recreation activity that is organized and becomes
a life style is of special importance to the planner. These activities
bring unique problems that the solitary or unorganized recreationist does
not present.

Other satisfactions

Rothforb's (1970) study of the college man who exercises has possible
application to outdoor recreation activities requiring exercise. The
researcher found that this group were inner-directed, critical of ritual-
istic traditions, and autonomous in their daily activities, thinking and

decision making. He also avoids responsibility, obligations and tends to be dependent when in conflict. He tends to be oriented toward his own feelings and motives. Planning efforts for this group should be directed toward rationale that satisfy the particular user. Arguments should not be presented as tradition, but should appeal to the person's desires for few restrictions and controls.

A more theoretic article on play, outdoor recreation, and its satisfactions was by Czikszentmihalyi (1975). The author believes that when an activity is practiced with total concentration the satisfactions tend to come only from the activity, not the environment. The author also believes that people do not derive the same rewards from the same activity. Instead, the "flow" or "peak" experience is the common satisfaction for activities demanding a clearly detailed process. Implications of his concept could be the planning or development of specific sites to carry out an activity. If the process or the activity is most important, then environmental or resources considerations are of little importance.

Conclusions

The available literature on the psycho-satisfactions of outdoor recreation is complex, highly varied as to quality, research methods, and the applicability of the results. Most of the research that is available is based on one or more theories of human behavior and motivation. The variety of theories in the field of human psychology and sociology reflect the difficulty in researching and drawing conclusions concerning human activity. While it is possible to draw conclusions for society as a group, individuals remain unique and difficult to categorize.

It is not surprising that recreation research on the psycho-social satisfactions of outdoor recreation provide few conclusive answers for the recreation planner or manager. In part the problem lies with the relative youth of the recreation profession and the lack of standardized and established research methods. Early research, dating from the 1960's, concerned the characteristics of outdoor recreationists. The next step investigated the motivations of the recreationist. What was the person looking for in his pursuit of recreation? This approach was useful but an individual approached by a researcher is usually not capable of fully understanding or explaining the deep-seated emotional or psychological reasons for their activity.

More recent research, most of it available in the 1970's, has reached the point of investigating the end product of a recreation experience-- satisfaction, or dissatisfaction. The relative scope of the available studies has been small. The results have not been tested and confirmed over large geographic areas or between age groups, or various recreation

subgroups. Recent recreation activities such as hang gliding have not been researched or at least results have not been published. The field of psycho-social research has not reached maturity.

Nevertheless the existing research that is available is useful to the planner or manager. An important fact to appreciate is the state of the research, its limitations and possibilities. There are no formulas or easy solutions to the complex question: What are the satisfactions of this activity at this location? How can a piece of land be allocated to maximize satisfaction for the most people? Some activities that become a "way of life," such as motocross riding, present possibilities to the manager and potential problems. Substitution of the satisfactions from camping might be available but not the satisfactions of a motocross rider. Recreationists seeking experiences with nature or solitude will not be compatable with equipment-oriented recreationists or those whose satisfaction comes from the display of skills or equipment.

For the planner, one problem is the overlapping of satisfactions and dissatisfactions between activities. One group of campers may be compatable with ORV's while another group is repelled by contact with such equipment. One pitfall lies in making blanket judgements for all participants in an activity. Practitioners of an activity are pluralistic and many recreationists are active in more than one activity, some of which seem in conflict with each other. Research trends have certainly been to identify more and more subgroups within a recreation population, often with striking differences in attitudes, perceptions and expectations. Each of these items, attitude, perception, and expectation, has a dramatic impact on satisfaction.

If satisfaction from recreation remains an illusive product, some principles seem relevant. The need for continual learning and probing into the phenomenon of outdoor recreation and its ramifications for land management seem to be one lesson. The unique character of the human race and its rich variety seems a strength as well as a planning challenge. The public lands need to serve a pluralistic society. The public's wide array of expectations and satisfactions will be best served by a spectrum of recreational opportunities. But neither are all satisfactions capable of being met by public land management.

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